TWO NEW MITES IN THE GENUS TYPHLODROMUS

(Acarina, Phytoseiidæ)

By E. A. McGregor

Two mites in the family Phytoseiidæ, collected on lemon fruits, which could not be associated with known species, were referred to Dr. Philip Garman for his examination.

Regarding the following species, Dr. Garman compared it especially with *Typhlodromus tiliæ* Oudms., and *T. rhenanus* (Oudms.), and confirmed my belief that the mite differs from each of these, and other related species, in several structural features. Garman believed that the divergent characters of this mite make it distinctive. Its description follows.

Typhlodromus californicus, new species

Male. Somewhat narrowly ovate in outline, narrower anteriorly. The dorsal shield bears 18 pairs of setæ, the longest of which is La, the other setæ short, each failing much of reaching the base of seta in next row. Two setæ occur each side in the interscutal membrane. Seta L₄ is paired with seta S₁; seta M₂ is even with a point between setæ L₈ and S₂; seta L₂ is exceedingly minute. Three small platelets occur each side submarginally on the dorsal shield; the most conspicuous of these is behind L₅, and is heartshaped. A lunate ridge rims seta S2 inwardly. The sternal scutum bears the usual 5 pairs of setæ, and its lateral margins each have 5 acute projections, the second being somewhat the most prominent, and with a pore at its base; a similar pore occurs behind the first seta of this scutum. The ventrianal scutum is cordate, with an emargination anteriorly behind each coxa IV; this scutum bearing 4 pairs of preanal setæ in two transverse rows, the anterior row rather remote from front margin; a pair of lunate pores between and behind the bases of the middle setæ of the hind row. The peritremal plates posteriorly bent inward at right angles, acuminate distally. The chelicera not in position to be studied. A long, strong hair on base of tarsus IV.

Type Habitat: Lemon fruit, Whittier, Calif.

Type: Slide No. McG. 11-8, Jan. 16, 1953. Collected by F. Munger.

Regarding the following mite, Dr. Garman confirmed my belief that it is unlike any known species, and stated "it would seem reasonable, therefore, to regard it as a new species", and he hoped I would describe it.

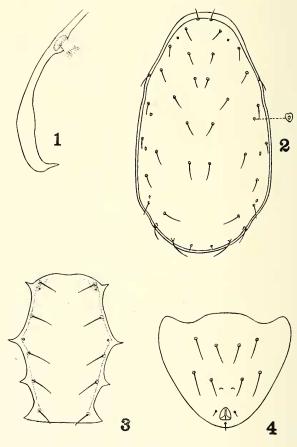


PLATE 21

Typhlodromus californicus, new species (male)

- 1. Peritremal plate
- 2. Dorsum of male
- 3. Sternal scutum
- 4. Ventrianal scutum

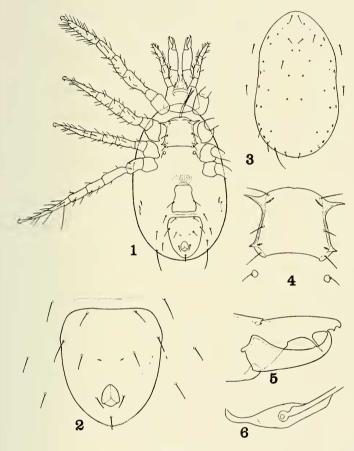


PLATE 22

Typhlodromus mungeri, new species (female)

- 1. Female, ventral view
- 2. Ventrianal scutum
- 3. Dorsal shield

- 4. Sternal scutum
- 5. Chelicera
- 6. Peritremal plate

Typhlodromus mungeri, new species

Female: Oval in outline with apex forward. The dorsal shield bears 17 pairs of setæ, the longest of which is L₉, the others being mostly short. Two setæ occur each side on the interscutal membrane. Seta L₇ is paired with M₂. Two very short setæ arise caudally between the L₉ setæ. Six small, narrowly elliptical platelets occur each side just within the margin of the dorsal shield; one opposite seta L_2 , one behind L_4 , one opposite L_5 , one opposite L_6 , one before L₇, and one between L₇ and L₈. In addition to these marginal platelets, 3 minute pores occur each side laterally: One between setæ L, and L, one behind L, and one just inside seta L₈. The sternal scutum is square trapezoidal, with 3 pairs of setæ; a narrow elliptical pore occurs behind each anterior seta, and a similar pore in front of each hind seta; this scutum bears at each humeral corner a fanglike extension, and a smaller sharp projection laterad of each posterior pore. A round metapodal plate occurs just mediad of each coxa III, each plate bearing a bristle. The genital scutum is thimble-shaped, truncate caudally, narrower forward, bearing one pair of setæ. A linear strip extends crosswise between the genital and ventrianal scuta. The latter scutum roughly ovate, truncate anteriorly, slightly longer than greatest width, wider in front than behind; bearing 3 pairs of preanal setæ, and between the posterior pair, a pair of narrowly separated pores; the ventrianal scutum faintly imbricated. Four additional ventral setæ arise each side behind genital scutum, of which VL, is the longest. A pair of narrow parapodal plates present, opposite the genital scutum. The peritremal plates narrowing posteriorly, bent weakly inward, acute terminally. The biting portion of the fixed chelicera bears 3 weak teeth terminally, and a long, thin sharp spine; the movable element bears an inconspicuous tooth opposite the spine. The tarsus of leg IV bearing a rather long, thick hair.

Type Habitat: Under calyx "button" of lemon fruit, College grove, Whittier, Calif.

Type: Slide McG. No. X-51, containing two specimens. Collected Feb. 17, 1953, by F. Munger, who stated that this mite evidently was feeding on the citrus red mites, which were common on the trees.